

NATURAL RESOURCES AND CLIMATE CHANGE

Californians are now experiencing first-hand the damaging effects of climate change, with extreme weather events affecting every part of the state. In the past year, the most severe drought in California’s recorded history was halted by one of the wettest seasons on record, causing significant flood-related damage. The summer months saw the highest average temperatures in California’s recorded history. Between October and December, the combination of increased fuel-loading vegetation from the winter storms, millions of dead trees and extreme winds triggered the most destructive wildfires in the state’s history.

These events devastated communities in Northern and Southern California, presenting new challenges and strengthening the state’s resolve to combat climate change and design resilient communities.

COMBATING CLIMATE CHANGE

Over the past several years, the Administration and the Legislature have worked together to enact landmark legislation that establishes California as a global leader in the fight against climate change.

- Chapter 830, Statutes of 2012 (SB 535)—Established a requirement that at least 25 percent of Cap and Trade proceeds be invested in disadvantaged communities disproportionately impacted from environmental pollution.

- Chapter 547, Statutes of 2015 (SB 350)—Doubled the rate of energy efficiency savings in California buildings and requires 50 percent of the state's electricity be generated from renewable sources by 2030.
- Chapter 395, Statutes of 2016 (SB 1383)—Established statewide reduction targets for short-lived climate pollutants.
- Chapter 249, Statutes of 2016 (SB 32)—Established a statewide greenhouse gas (GHG) emission reduction target of 40 percent below 1990 levels by 2030.
- Chapter 545, Statutes of 2016 (SB 1386)—Established a statewide policy for the protection and management of natural and working lands as an important strategy in meeting the state's GHG reduction goals.
- Chapter 250, Statutes of 2016 (AB 197)—Prioritized direct emission reductions from large stationary and mobile sources.
- Chapter 135, Statutes of 2017 (AB 398)—Extended and improves the Cap and Trade Program, which will enable the state to meet its 2030 emission reduction goals in the most cost-effective manner.
- Chapter 136, Statutes of 2017 (AB 617)—Established a new program to reduce emissions from mobile and stationary sources at the neighborhood level in the communities most impacted by air pollutants.

The state's climate programs span all sectors—industrial, electricity, transportation, and natural and working lands. The Renewables Portfolio Standard, Low Carbon Fuel Standard, Cap and Trade Program, Advanced Clean Cars program, Short Lived Climate Pollutant Reduction Strategy, Sustainable Freight Action Plan, and the developing Natural and Working Lands Implementation Plan all serve as models for partners throughout the United States and the world. Throughout the implementation of these programs, the state's population and economy have continued to grow, yet GHG emissions have decreased and per capita electricity consumption remains flat.

California is on track to meet the 2020 goal of reducing GHG emissions to 1990 levels early, giving the state a head start on the 2030 goal. However, California represents only a small fraction of global GHG emissions. To catalyze action throughout the world, the state has partnered with numerous jurisdictions to establish joint agreements to take steps to reduce GHGs and other air pollutants. Over 200 jurisdictions have signed on to the Under 2 MOU, agreeing to take steps to limit temperature increases to less than two degrees Celsius by 2050, the warming threshold at which scientists predict that dangerous climate disruptions will occur. California is also a founding member of the Zero Emission Vehicle (ZEV) Alliance, a group of

14 jurisdictions seeking to collaborate with other governments to expand the global zero-emission vehicle market and enhance government cooperation on ZEV policies. These efforts will combat air pollution, limit global climate change, and reduce oil dependence by increasing ZEV deployment. Closer to home, California is leading the U.S. Climate Alliance's initiative to slash emissions of methane, hydrofluorocarbons, and black carbon. The Climate Alliance recently issued the Short-Lived Climate Pollutant Challenge, inviting all national and subnational jurisdictions, businesses, and other actors to take substantial and immediate action to reduce emissions of these super pollutants.

The Administration is building on these partnerships, hosting the Global Climate Action Summit in San Francisco this fall. The Summit's theme is "Take Ambition to the Next Level", and will bring together leaders from around the globe to launch deeper worldwide commitments and accelerated national action, supported by all sectors of society, to prevent dangerous climate change and achieve the goals of the historic Paris Agreement.

CAP AND TRADE EXPENDITURE PLAN

Since 2013, the state has appropriated \$6.9 billion in auction proceeds to support transit and high-speed rail, affordable housing near jobs and services, forest and watershed improvements, healthy soils, recycling infrastructure and home energy efficiency upgrades. Further, the state has prioritized the expenditure of these funds in disadvantaged communities.

The Budget includes a \$1.4 billion Cap and Trade Expenditure Plan that invests in programs that further reduce GHG emissions, support climate resiliency efforts, and benefit disadvantaged communities. (See Figure RES-01). This funding is consistent with the following expenditure priorities specified in AB 398:

- Air toxic and criteria air pollutants from stationary and mobile sources.
- Low and zero-carbon transportation alternatives.
- Sustainable agricultural practices.
- Healthy forests and urban greening.
- Short-lived climate pollutants.
- Climate adaptation and resiliency.
- Climate and clean energy research.

Figure RES-01
2018-19 Cap and Trade Expenditure Plan
(Dollars in Millions)

Investment Category	Department	Program	Amount
Air Toxic and Criteria Air Pollutants	Air Resources Board	AB 617 - Community Air Protection	\$245
		AB 617 - Local Air District Implementation (\$50 million total, including other funds)	\$20
		Technical Assistance to Community Groups	\$10
Low Carbon Transportation	Air Resources Board	Clean Vehicle Rebate Project	\$175
		Clean Trucks, Buses, & Off-Road Freight Equipment	\$180
		Enhanced Fleet Modernization Program, School Buses & Transportation Equity Projects	\$100
	Energy Commission	Low Carbon Fuel Production	\$12
Climate Smart Agriculture	Air Resources Board	Agricultural Diesel Engine Replacement & Upgrades (\$132 million total, including other funds)	\$112
	Energy Commission	Energy Efficiency	\$64
	Department of Food and Agriculture	Healthy Soils	\$5
	Energy Commission	Renewable Energy	\$4
Healthy Forests	CAL FIRE	Healthy & Resilient Forests	\$160
	CAL FIRE	Forest Carbon Plan: Prescribed Fire & Fuel Reduction	\$30
	Natural Resources Agency	Forest Carbon Plan: Northern, Coastal, and Southern California Regional Forest Health Projects	\$20
	CAL FIRE	Urban Forestry	\$5
	CalOES	Local Fire Response	\$25
Short-Lived Climate Pollutants	Department of Food and Agriculture	Methane Reduction	\$99
	Air Resources Board	Woodstoves	\$3
	CalRecycle	Waste Diversion	\$25
Integrated Climate Action: Mitigation & Resilience	Strategic Growth Council	Transformative Climate Communities	\$40
	Natural Resources Agency	Urban Greening	\$20
	Multiple Departments	Coastal Resilience	\$5
	Department of Fish and Wildlife	Wetlands Restoration	\$5
	Community Services & Development	Low-Income Weatherization	\$10
	California Conservation Corps	Energy Corps	\$6
Climate and Clean Energy Research	Strategic Growth Council	California Climate Change Technology and Solutions Initiative & Technical Assistance	\$20
Total			\$1,400

The Cap and Trade Expenditure Plan also supports the Administration's Forest Carbon Plan and Zero-Emission Vehicle Investment Initiative.

FOREST CARBON PLAN

California's 33 million acres of forestland and its urban forest canopy capture and clean the state's water supply, provide habitat for countless wildlife, cool cities, support local economies, and serve as cultural centers for indigenous and local communities across the state. Forested lands are also the largest land-based carbon sink with trees and underbrush drawing carbon from the atmosphere and storing it in their biomass and in forest soils. Growing evidence, however, suggests these lands will become a source of overall net GHG emissions if actions are not taken to enhance their health and resilience and reduce the threats they face from wildfire, insects, disease, and a changing climate.

Decades of fire suppression, coupled with drought and the effects of climate warming, have dramatically increased the size and intensity of wildfires, and exposed millions of urban and rural residents to unhealthy smoke-laden air. These conditions threaten progress toward meeting the state's long-term climate goals.

Recent wildfires have been the deadliest, most destructive, costliest, and largest in state history, and more than 129 million trees, primarily in the Sierra Nevada, have died from drought and insects since 2010. It is estimated that as many as 15 million acres of California forests need some form of restoration.

The Administration recently released the California Forest Carbon Plan, which serves as a scientific foundation and policy vision for improving the health and resiliency of California's forests against the worsening threats of fire and disease driven by climate change.

The Governor issued an executive order calling for an expansion of forest restoration and management activities in alignment with the Forest Carbon Plan. A Forest Management Task Force has been convened to coordinate these efforts.

The Budget provides \$99.2 million to implement key recommendations of the Forest Carbon Plan.

Significant Adjustments:

- Prescribed Fire and Fuel Reduction—\$30 million of Cap and Trade funding and 79 positions for CAL FIRE to complete additional fuel reduction projects through the operation of six year-round prescribed fire crews and implementation of a forest health research and monitoring program. This funding supports the Forest Carbon Plan's recommendation to increase the rate of prescribed fire and fuel reduction, allowing CAL FIRE to treat 60,000 acres per year.

- Sierra Regional Forest Health Projects—\$30 million Proposition 68 for the Sierra Nevada Conservancy to expand the Watershed Improvement Program and fund Forest Carbon Plan recommended activities. This Program, guided by a Memorandum of Understanding between the Natural Resources Agency and the U.S. Forest Service, supports regional, landscape-level forest restoration projects in collaboration with federal and local agencies.
- Northern, Coastal and Southern California Regional Forest Health Projects—\$20 million of Cap and Trade funding for the Natural Resources Agency to provide block grants to support regional implementation of landscape-level forest restoration projects that leverage non-state funding. This proposal will duplicate the Sierra Nevada Conservancy's Watershed Improvement Program by expanding the program model to the Northern, Coastal and Southern California regions.
- Legacy Forests at State Parks—\$15 million Proposition 68 for the Department of Parks and Recreation to protect forests in state parks. This funding will support restoration efforts in state parks throughout the state, including coastal redwoods, central Sierra sequoias, coastal pines, and oak woodlands.
- Watershed Coordinator Grants—\$1.9 million Environmental License Plate Fund for the Department of Conservation to provide grants to local entities to develop and implement watershed improvement plans.
- Markets for Wood Products—\$2.3 million Timber Regulation and Forest Restoration Fund for multiple programs that will encourage markets for wood products, including (1) establishment of a Joint Institute for Wood Products Innovation, (2) financial support for mass timber and wood product manufacturing, and (3) grants for local jurisdictions to showcase the architectural design of mass timber buildings.

ZERO-EMISSION VEHICLE INVESTMENT INITIATIVE

The transportation sector is responsible for 50 percent of the state's GHG emissions and 80 percent of smog-forming oxides of nitrogen that contribute to the state's air quality challenges. To meet climate goals and clean air standards, California must dramatically reduce transportation sector pollution.

In January, the Governor issued Executive Order B-48-18, setting a new ZEV target of 5 million ZEVs in California by 2030. In addition, the Executive Order calls for the construction and installation of 200 hydrogen fueling stations and 250,000 zero-emission vehicle chargers, including 10,000 direct current fast chargers, by 2025.

The Budget includes \$334.5 million for the Energy Commission and the Air Resources Board to begin the implementation of an eight-year initiative to accelerate sales of zero-emission vehicles through vehicle rebates and infrastructure investments. This new ZEV initiative envisions a total of \$2.4 billion over eight years and, when combined with private investment, will meet and exceed the goal of 1.5 million ZEVs on California's roadways by 2025, and provide a solid foundation to achieve the 5 million ZEV goal by 2030.

Significant adjustments:

- **Clean Vehicle Rebates**—\$200 million of Cap and Trade funding for the Air Board to provide rebates to California residents for the purchase or lease of new light-duty zero-emission vehicles and plug-in hybrids, including \$25 million for incentives for low-income consumers. This annual funding of \$200 million will continue through 2025, reflecting the state's commitment to achieve its ZEV target.
- **Alternative Fuel Infrastructure**—\$134.5 million Alternative and Renewable Fuel and Vehicle Technology Fund for the Energy Commission to accelerate investments in the statewide network of ZEV infrastructure. This funding represents over a 300 percent increase in state infrastructure investments for the budget year, with a goal of providing a multi-year investment of \$800 million for ZEV infrastructure through 2025.

CLIMATE RESILIENCY AND ADAPTATION

California has historically been susceptible to wildfires and hydrologic variability. However, climate change intensifies extreme weather events such as coastal storm surges, drought, wildfires, floods and heat waves. As GHG emissions continue to accumulate and climate disruption grows, such destructive events will become more frequent. The extreme natural events of 2017 and the cascading impacts to people, utility infrastructure and the natural environment underscore the necessity to prepare for and mitigate the effects of climate change. These issues are challenging and require state and local governments and private industry to come together to address land use and infrastructure improvements.

So far in 2018, several groundbreaking climate resiliency documents have been released to help better plan for and understand climate change. Together, they reflect the Administration's comprehensive cross-agency response to make California's communities, natural systems, and built environment resilient to climate change:

- California’s Climate Adaptation Strategy—The 2018 Update to Safeguarding California catalogs thousands of actions 38 state agencies are taking to prepare for climate change and strategies that will increase resiliency for people, infrastructure and natural resources.
- Sea Level Rise—The Ocean Protection Council’s State of California Sea-Level Rise Guidance: 2018 Update provides a methodology for state and local governments to analyze, assess, and plan for risks associated with sea level rise, underpinned by the latest sea-level rise projections.
- Protecting the State’s Forests—The California Forest Carbon Plan serves as a scientific foundation and policy vision for increasing the health and resiliency of California’s forests against the worsening threats of fire and disease driven by climate change.
- Basing Actions in Science—The State’s 4th Climate Change Assessment consolidates the best available scientific understanding of how climate change is impacting the state. This body of science will serve as the foundation for how state agencies, local governments, and the public respond to forecasted climate change impacts.

The Budget provides significant additional funding to support implementation of these plans and scientific findings through a wide range of climate adaptation and resilience projects to enable local communities, state infrastructure and natural ecosystems to better withstand the impacts of climate change.

PROPOSITION 68—CALIFORNIA DROUGHT, WATER, PARKS, CLIMATE, COASTAL PROTECTION, AND OUTDOOR ACCESS FOR ALL

Approved by the voters in June, Proposition 68 authorizes \$4 billion in general obligation bonds for California’s parks, water and flood control infrastructure, ocean and coastal protection, safe drinking water, groundwater management and climate preparedness and resiliency.

The Budget provides \$1.24 billion for the first year of implementation (see Figure RES-02). Of this amount, \$210 million is dedicated to climate adaptation and resiliency programs, including coastal protection. Projects funded by the bond measure in 2018-19 are primarily prioritized to support existing programs, “shovel-ready” projects, and a phase-in approach for newly established programs.

Figure RES-02

**California Drought, Water, Parks, Climate, Coastal Protection and Outdoor Access
For All (Proposition 68)**
(Dollars in Millions)

Investment Category	Department	Program	2018-19 Amount
State and Local Park Improvements	Department of Parks and Recreation & Natural Resources Agency	Local and Regional Grant Programs for Neighborhood Parks, Greenway Trails, and Enhancement of Natural and Cultural Resources	\$503
	Department of Parks and Recreation	State Park System Enhancements	\$4
	Department of Food and Agriculture	Deferred Maintenance for Fairs	\$4
Ecosystem Restoration & Climate Resiliency	Multiple Departments & Conservancies	River Recreation, Creek, and Waterway Improvements	\$78
	Natural Resources Agency	Salton Sea Restoration	\$30
	Multiple Departments & Conservancies	Climate Adaptation & Resiliency	\$157
	State Coastal Conservancy & Ocean Protection Council	Coastal Protection	\$53
	Sierra Nevada Conservancy & Department of Parks and Recreation	Forest Carbon Plan Implementation	\$45
	California Conservation Corps	CCC Restoration and Rehabilitation Projects & Grants to Local Community Conservation Corps	\$10
Water Action Plan	State Water Board	Safe Drinking Water Projects	\$93
	Department of Water Resources & Natural Resources Agency	Flood Management	\$99
	Department of Water Resources & State Water Board	Sustainable Groundwater Management Act	\$146
	Department of Food and Agriculture	State Water Efficiency and Enhancement Program	\$18
Total			\$1,239

For additional information on Proposition 68 proposals for water and parks-related programs, see the California Water Action Plan and Department of Parks and Recreation sections of this chapter.

CALIFORNIA WATER ACTION PLAN

Released in January 2014, the Water Action Plan provides a blueprint for California to build more reliable and resilient water systems and restore important ecosystems. The Budget builds upon investments from previous years and continues prioritizing the ten actions of the Water Action Plan, including improving groundwater management, enhancing flood protection, providing safe drinking water, restoring important ecosystems and promoting water conservation.

GROUNDWATER SUSTAINABILITY

Climate change will affect the state's water supply reliability as a result of more frequent droughts and reduced Sierra snowpack. California's five-year drought from 2012 through 2016 included a record-setting period of the four consecutive driest years of statewide precipitation. Consequently, effective management of groundwater resources is an essential component of the state's future water management strategy.

In 2014, the Governor signed a package of groundwater management bills that directed cities, counties, and water districts to work together to prevent long-term over-pumping of groundwater basins. The underlying principle of the Sustainable Groundwater Management Act of 2014 (SGMA) is that groundwater is best managed locally. SGMA places significant responsibilities upon local agencies to organize, plan, and ultimately manage their groundwater resources to a sustainable level within a 20-year time horizon, along with fee authority to help cover costs. However, the state will intervene temporarily to protect groundwater basins when local agencies are unwilling or unable to adequately do so.

Local agencies have formed groundwater sustainability agencies covering over 99 percent of the state's high and medium priority groundwater basins. However, the major challenge for local agencies and the Department of Water Resources (DWR) remains the development and implementation of groundwater sustainability plans that serve as the foundation to achieving statewide goals and requirements under SGMA.

The Budget includes \$146 million to continue SGMA implementation and groundwater treatment activities.

Significant Adjustments:

- **SGMA Implementation**—\$61.8 million Proposition 68 for the DWR to support groundwater sustainability agencies through three key efforts: (1) providing technical assistance to aid in the development and evaluation of their plans, (2) supplementing existing planning grants to support a groundwater sustainability agency's responsibility to define a path to achieve sustainable groundwater management, and (3) providing grants directly supporting implementation of groundwater projects.
- **Groundwater Treatment**—\$84 million Proposition 68 for the State Water Board to support regional groundwater treatment and remediation activities that prevent or reduce contamination of groundwater, including \$10 million for technical assistance for drought and groundwater investments.

FLOOD CONTROL INFRASTRUCTURE

The 2017 update to the Central Valley Flood Protection Plan identified \$17 billion to \$21 billion in flood system investment needs over the next 30 years, including urban and non-urban projects, systemwide projects, operations and maintenance, and deferred maintenance. Of the total need, the Plan identifies approximately \$88 million annually for operations and maintenance.

Over the past decade, voters have approved several General Obligation bonds that have provided approximately \$5 billion in flood control improvements. In addition, the recently approved Proposition 68 includes \$550 million for flood control programs.

In recognition of the impacts of climate change and the likelihood of more severe storms and extreme weather events in the coming decades, the Budget includes an additional \$393 million, including \$295 million General Fund, to enhance the state's resilience to catastrophic flooding. These funds provide strategic investments for flood control infrastructure to protect lives and property that also leverage local and federal funding and reduce potential state liability.

Significant Adjustments:

- **Urban Flood Control Projects**—\$170 million General Fund on a one-time basis to support the state cost-share of U.S. Army Corps of Engineers' urban flood control projects that will contribute to a 200-year level of flood protection in urban areas of the Central Valley. This funding will strengthen the state's ability to leverage approximately \$690 million in federal funding.

- **Deferred Maintenance**—\$100 million General Fund on a one-time basis to address deferred maintenance projects on levees. These funds will be prioritized to address critical and serious sites, including repair and rehabilitation of damaged levees and infrastructure identified as a result of the 2017 storms.
- **Multi-Benefit Flood Control Projects**—\$98.5 million Proposition 68 for flood control projects that achieve public safety and fish and wildlife improvements, as well as funding for a new Floodplain Management, Protection and Risk Awareness Program to protect California's alluvial fan, coastal, and riverine floodplains. This funding, along with previously appropriated Proposition 1 and 1E funds, supports an integrated systemwide approach to flood management and implementation of the Central Valley Flood Protection Plan.
- **Operations and Maintenance**—\$25 million General Fund to support ongoing levee maintenance. These funds will provide incentives for cost-sharing with local maintaining agencies by (1) encouraging a regional governance model that will better allow local entities to assess local beneficiaries of the levee system and (2) updating assurance agreements with the state to clarify levee maintenance responsibilities. Funds will also be available for priority projects that reduce potential state liability.

SAFE AND AFFORDABLE DRINKING WATER

The Administration has worked with the Legislature to implement a number of reforms to improve access to safe drinking water, including (1) transferring the Drinking Water Program from the California Department of Public Health to the State Water Board to better align the state's drinking water and water quality programs, (2) establishing the Office of Sustainable Water Solutions within the State Water Board to provide technical and financial assistance for small, disadvantaged communities to promote permanent and sustainable solutions, (3) providing funding through Proposition 1 and the Drinking Water State Revolving Fund to assist public water systems with providing safe drinking water, (4) requiring testing of lead found in drinking water at public schools, and (5) authorizing the State Water Board to require the consolidation of local water systems or the use of a third-party administrator for public water systems that consistently fail to deliver safe drinking water.

Since 2010, the state has provided approximately \$3 billion in assistance to help address safe and affordable drinking needs. This funding supported projects that:

- Addressed drinking water emergencies in 275 communities with a total population of over 400,000, most of which were disadvantaged. The projects included providing bottled water, hauled water, establishing emergency interconnections, and repairing/rehabilitating wells.

- Delivered technical assistance to over 550 communities with a total population of over 450,000. The assistance included community needs assessments, preparation of funding applications, and supporting improvements in the technical, managerial, and financial capacity of water systems in small communities.
- Supported repair, replacement, and improvement of old infrastructure and new treatment systems for over 600 projects to comply with the Safe Drinking Water Act.

Despite these efforts, many local water systems in the state, particularly those serving small disadvantaged communities, consistently fail to provide safe drinking water to their customers. The most significant remaining challenge is the lack of a stable funding source for long-term operation and maintenance of drinking water systems. This limits the ability to address the additional capital costs for hundreds of small systems and domestic wells that cannot be consolidated, cannot afford to maintain their own system, and are currently serving drinking water that does not meet public health standards.

The Administration remains committed to continuing discussions with the Legislature on a comprehensive package to address safe and affordable drinking water needs this summer. To this end, the Budget sets aside an additional \$23.5 million General Fund to address safe drinking water needs as part of these continuing discussions.

Significant Adjustment:

- Safe Drinking Water Project—\$93 million Proposition 68 for the State Water Board to provide grants to public water systems in disadvantaged communities for infrastructure improvements to meet safe and affordable drinking water standards, including both drinking water and wastewater treatment projects. Of this amount, \$27 million is available to improve regional water supply within the San Joaquin River watershed and \$30 million is available for the Pure Water San Diego program.
- Lead Testing for Child Care Centers—\$5 million General Fund for the State Water Board to provide grants for lead testing in drinking water at licensed child care centers, remediation of lead in plumbing and drinking water fixtures, and technical assistance for licensed childcare providers, with a priority to centers that serve children up to five years of age.

MAKING WATER CONSERVATION A WAY OF LIFE

A key principle in the California Water Action Plan is to make water conservation a way of life. Improving water conservation is essential for a more reliable water supply and to make the state more resilient to future droughts, particularly given population increases and climate change.

After declaring an end to the drought emergency in 2017, the Governor directed the State Water Board to maintain urban water use reporting requirements and prohibitions on wasteful practices, such as hosing off sidewalks. At the same time, the DWR, Energy Commission, Public Utilities Commission, Department of Food and Agriculture, and the State Water Board issued a final report with recommendations to (1) use water more wisely, (2) eliminate water waste, (3) establish permanent water use and conservation reporting requirements, (4) strengthen local drought resilience, and (5) improve agricultural water use efficiency and drought planning.

Additionally, the Administration worked with the Legislature in enacting Chapter 14, Statutes of 2018 (SB 606), and Chapter 15, Statutes of 2018 (AB 1668), to permanently conserve water resources in the state. This legislation directs the DWR and the State Water Board to develop and adopt water use efficiency objectives for large urban water suppliers based on new standards for indoor use, outdoor use, and water system leaks; revises Agricultural Water Management Plans to include annual water budgets; and requires urban water suppliers to annually calculate water use objectives in an effort to better manage and conserve California's water resources. This will result in more detailed and comprehensive water planning at the local level, while also providing the State Water Board and the DWR better information to assist the state in managing limited water supplies. This level of detailed planning will become increasingly important as California continues to experience the effects of climate change.

The Budget builds on these efforts to encourage Californians to conserve water.

Significant Adjustments:

- State Water Efficiency and Enhancement Program—\$18 million Proposition 68 for the Department of Food and Agriculture to provide financial incentives to farmers for the installation of water irrigation systems that reduce both water and energy use in agricultural operations.

- Save Our Water Campaign—\$300,000 Environmental License Plate Fund for the DWR to support ongoing outreach and advertising to sustain the Save Our Water campaign as an effective tool to promote water conservation as a part of Californians’ everyday lives.

RESTORING IMPORTANT ECOSYSTEMS—SALTON SEA

The Salton Sea is California’s largest lake. Thirty-five miles long and fifteen miles wide, the desert lake extends from the Coachella Valley into the Imperial Valley. Though saltier than the ocean, the lake supports an abundance of fish, which serve as a food source for millions of migratory birds on the Pacific Flyway. Managing the sea’s natural, agricultural, and municipal water inflows to maximize bird and fish habitat and minimize fine-particle air pollution will allow California to protect regional health, ecological wealth, and a stable water supply.

Led by the Natural Resources Agency, the Salton Sea Management Program guides immediate and long-term investment in habitat and air quality projects to manage increasing lakebed exposure resulting from declining water inflows. The Phase I plan identifies project areas and acreage milestones the state will construct to meet a combined goal of 29,800 acres of habitat and air quality projects by 2028. The State Water Board finalized a water rights order that adopted the policy goals and project milestones of the Phase I ten-year plan and will provide continued oversight of the program’s achievement of those goals.

Significant Adjustment:

- Salton Sea Restoration—\$30 million Proposition 68 for the Natural Resources Agency to construct water management infrastructure and habitat conservation and dust mitigation projects, consistent with the Phase I ten-year plan. This funding builds on existing appropriations from Propositions 1, 84, and 50 that will be used to meet the goals of the plan.

DEPARTMENT OF FORESTRY AND FIRE PROTECTION

CAL FIRE provides resource management and wildland fire protection services covering over 31 million acres. It operates 234 fire stations, and also staffs local fire departments when funded by local governments. CAL FIRE contracts with county agencies in six counties to provide wildland fire protection services. The Budget includes \$2.5 billion (\$1.5 billion General Fund) and 7,182.5 positions for CAL FIRE.

Climate change is ushering in extreme weather and a fire season that has become essentially year-round, with larger and more intense fires. Eleven of California's most destructive wildfires have occurred in the last ten years. Historically, CAL FIRE responds to over 5,600 wildfires annually. In recent years, wildfires have increased, reaching approximately 2,000 more than average in 2017.

In recognition of these conditions, the 2017 Budget included: (1) additional ongoing funding of \$42.4 million to expand the state's firefighting capabilities and extend the fire season, and (2) \$200 million of Cap and Trade funds to support healthy and fire resilient forests.

The Budget makes additional investments to enhance CAL FIRE's capacity to protect California residents.

Significant Adjustments:

- **Helicopter Procurement**—\$101.2 million General Fund to support replacement of the CAL FIRE's fleet of Vietnam War-era helicopters. This funding will begin a multi-year effort to fully replace the Department's aging fleet with new modern helicopters. These new helicopters will have enhanced firefighting capabilities, including the ability to fly at night, which will improve CAL FIRE's ability to respond to the increasing number and severity of wildfires resulting from climate change.
- **Climate Change Fire Severity**—\$10.9 million General Fund to provide heavy equipment mechanics, vehicle maintenance funding, and associated administrative support staff to address the nearly year-round fire season. These resources build on the funding provided for additional year-round fire engines and extended fire season staffing in the 2017 Budget and reflect continued efforts to meet the demands of longer, more severe fire seasons driven by climate change.
- **McClellan Reload Base**—\$4 million General Fund for six permanent positions and 6.1 seasonal positions to staff and operate the McClellan Reload Base for the rapid deployment of large air tankers and the California National Guard Modular Airborne Fire Fighting Systems.
- **Fire Training Center**—\$26.6 million General Fund for CAL FIRE, the California Department of Corrections and Rehabilitation, and the California Conservation Corps to operate the Firefighter Training and Certification Program for ex-offenders, as described in the Public Safety Chapter. The 18-month program will enable 80 ex-offenders, as well as 20 corpsmembers, to gain the training and experience needed to qualify for entry-level firefighting positions with local, state, and federal firefighting agencies.

DEPARTMENT OF FISH AND WILDLIFE

The Department of Fish and Wildlife manages California's diverse fish, wildlife, and plant resources, and the habitats upon which they depend for their ecological value and for their use and enjoyment by the public. While other state agencies' missions cover conservation, the Department is the state's trustee agency specifically charged with protecting and conserving fish and wildlife habitat. The Budget includes \$604.4 million (\$121.4 million General Fund) and 2,103.8 positions for the Department.

Since the California Fish and Wildlife Strategic Vision report was submitted to the Legislature in 2012, the Department has engaged closely with stakeholders on the establishment of a framework for sustainable funding to provide ongoing protection of fish and wildlife in California. These efforts produced a 2017 update to the Strategic Vision report, which identified numerous accomplishments in meeting the original goals identified in the 2012 report, as well as Supporting Healthy Fish and Wildlife Populations in California and Getting People Outdoors: An Expenditure Concept to Invest in Our Natural Heritage for All Californians, issued in November 2017.

Significant adjustment:

- Sustainable Funding for Fish and Wildlife—\$31.6 million (\$26.6 million General Fund and \$5 million California Tire Recycling Management Fund) to (1) continue the current level of service for core fish and wildlife programs, (2) augment high-priority programs that are consistent with the priorities identified in the most recent update to the Strategic Vision report, and (3) initiate an independent service-based budget review and develop a tracking system to support an analysis of the Department's existing revenue structure and program activities. The service-based budget review, which will be completed by 2021, is based on a similar service-based budget review performed for the Department of Parks and Recreation and will provide an objective foundation for future budget decision-making.

BIODIVERSITY PRESERVATION

California has some of the world's most unique geographical areas that support plant and wildlife biodiversity. It is home to more species of plants and animals than any other state in the United States, which creates a complex and distinctive ecosystem.

Significant adjustment:

- California Biodiversity Initiative—\$2.5 million General Fund on a one-time basis for the Department to improve understanding of the state's biological richness and preserve, manage and restore ecosystems, protecting the state's biodiversity from climate change. The Initiative will include partnerships with Tribes, educators and researchers, philanthropic organizations, the private sector, and landowners to preserve California's biodiversity.

DEPARTMENT OF PARKS AND RECREATION

The Department of Parks and Recreation protects and preserves the state's valued natural, cultural, and historical resources while providing recreational opportunities including hiking, camping, mountain biking, horseback riding, boating, and off-highway vehicle activities.

The Department achieves its mission through grant programs and a network of 280 parks, which include beaches, trails, wildlife areas, open spaces, off-highway vehicle areas, and historic sites. The Budget includes \$1.5 billion (\$285 million General Fund) and 2,306.2 positions for the Department.

FIX STATE PARKS

In recent years, there has been a concerted effort to improve Department management, responsiveness, and accountability. In February 2015, the Parks Forward Commission, a multidisciplinary advisory council created to independently assess the state parks system and make recommendations for potential improvements, provided recommendations to address financial, cultural, and operational challenges. By that time, the Administration had established the Transformation Team to develop specific initiatives. In May 2017, the Transformation Team completed its two-year term and released a final progress report. Although the work of the Transformation Team has ended, the Department has implemented these important reforms, as well as those suggested by the Legislature, and developed further innovations. These reforms include a new organizational structure, establishment of a new non-profit outside support organization as specified by Chapter 540, Statutes of 2016 (SB 1111), enhanced fiscal management tools developed from the Department's service-based-budgeting efforts, and modernized fee collection and technology.

Building upon these initiatives, the Budget includes ongoing funding of \$80 million State Parks and Recreation Fund to enhance the State Park System.

Significant Adjustments:

- **Fixing State Parks and Improving Access for All Californians—\$42 million** State Parks and Recreation Fund and 364 positions to increase services that emphasize those that directly benefit park visitors by improving access, and fixing and maintaining the aging infrastructure of the state parks system. The largest area of investment is facilities and maintenance, which will contribute to maintaining clean water supplies, clean restrooms, dynamic trail systems, stable historic structures, and safe roads. These additional resources will also help address more than \$1 billion in deferred maintenance projects throughout the state parks system. The natural and cultural management funding will allow the Department to better understand, protect, and preserve California's biologically and culturally diverse places under its care. The interpretation and education augmentations will build upon the Department's recent focus on developing stronger relationships with the public. The public safety positions will focus on providing a safe visitor experience in complex park environments and protecting cultural and natural resources.
- **Solving the Structural Imbalance and Establishing a Reserve—\$26.6 million** in permanent funding from the State Parks and Recreation Fund to address the structural imbalance. Since 2012, the Department has relied on one-time appropriations to maintain services across the park system. The Budget ends that pattern and provides sustainable ongoing funding, including \$8.5 million to establish a prudent reserve balance in the Fund.
- **Making Recruitment and Training Program Permanent—\$1 million** State Parks and Recreation Fund for the newly established recruitment and training program for hard-to-fill classifications, including an emphasis on diversity. The 2017 Budget included funding to initially establish the program.
- **Supporting Off-Highway Vehicle Recreation—\$1 million** State Parks and Recreation Fund for increased law enforcement, environmental monitoring, and maintenance grants supporting federal off-highway vehicle recreation. While the Department manages nine State Vehicular Recreation Areas for off-highway vehicle recreation, nearly 80 percent of the state's off-highway vehicle recreation occurs on federal lands, supported through the grants program.
- **Reducing Boating Hazards—\$1 million** State Parks and Recreation Fund for the Abandoned Watercraft Abatement grant program to remove abandoned watercraft from California's waterways. Submerged water vessels pose a hazard to boating recreation throughout the state.

IMPROVING AND INCREASING ACCESS TO LOCAL NEIGHBORHOOD PARKS

Proposition 68 includes over \$1 billion for multiple programs that improve and rehabilitate local park facilities as well as expand access to neighborhood parks. The Budget includes \$464 million to begin implementation of these local park programs:

- Safe Neighborhood Parks—\$277 million Proposition 68 to provide grants for the creation of new parks and recreation facilities, as well as the rehabilitation of existing local parks, in critically underserved communities throughout California, consistent with the Statewide Park Development and Community Revitalization Program.
- Per Capita Grants—\$186 million Proposition 68 to provide for the acquisition and development of neighborhood, community, and regional parks and recreation lands and facilities in urban and rural areas.

PROTECTING AND PRESERVING CALIFORNIA INDIAN HERITAGE

The Administration has strengthened the state's relationship with California's tribal communities by improving overall communication and enhancing transparency and government-to-government engagement with California Tribes. Executive Order B-10-11 established the Office of the Tribal Advisor to provide a direct link between Tribes and state agencies, allowing Tribes to actively participate in developing policies and priorities for tribal communities in partnership with the highest levels of state government. Under newly negotiated gaming compacts, Tribes are able to invest more gaming revenue into infrastructure and programs benefiting the tribal communities and promoting self-sufficiency.

The Budget builds on these efforts with additional state investments that will protect and preserve the rich history of the native peoples of California and memorialize the important contributions they have made to the state through the following investments:

- California Indian Heritage Center—\$100 million General Fund for the Department to construct a new museum to protect and preserve the history of California's native peoples. The total cost of the project is estimated at \$200 million. The Administration will work with stakeholders to raise the additional \$100 million necessary to complete the project. This new museum would replace the current State Indian Museum, which was built in 1940 on the grounds of Sutter's Fort State Historic Park. The Department would operate the museum and work with tribal representatives in developing appropriate content for the interpretive program to engage visitors in celebrating the living cultures of California Tribes.

- Fort Ross State Historic Park: Cultural Trail—\$852,000 Proposition 12 bond funds to design a new trail focusing on increasing the interpretive program at Fort Ross State Historic Park. The trail would complete a segment of the California Coastal Trail and a multimedia interpretive program encouraging park visitors to explore the complex history of the site. The interpretive program will be developed through a partnership with stakeholders including the native people of the area and UC Berkeley. Total project costs are estimated to be \$3.4 million.

MUSEUM OF TOLERANCE

Located in Los Angeles, the Museum of Tolerance is the educational branch of the Simon Wiesenthal Center. The Museum is dedicated to educating visitors about the Holocaust in both historic and contemporary contexts and providing a voice for social justice and human rights in the world today. The Museum has welcomed over 7 million visitors since it opened in 1993, and more than 160,000 law enforcement professionals have participated in a diversity training program to enhance their skills in delivering more effective services to the communities they serve. In addition, 130,000 middle and high school students visit the Museum each year as part of their schools' curriculum. The Museum provides a unique immersive learning environment to advance anti-bias education and promote the creation of inclusive and equitable schools.

Significant Adjustment:

- Museum of Tolerance Renovation Project—\$10 million General Fund on a one-time basis for the Department of Parks and Recreation to provide a grant for the Museum's renovation project. This funding will provide half of the estimated \$20 million cost of the renovation to fund critical capital improvements.

CALIFORNIA CONSERVATION CORPS

Established in 1976 during Governor Brown's first term, the California Conservation Corps is modeled after the original Civilian Conservation Corps of the 1930s. More than 120,000 young adults have served in the Corps over its 40-year history.

The Corps provides young women and men the opportunity to gain critical work experience and contribute to the ecological well-being of the state by responding to fires, floods and other disasters; restoring threatened environments; and installing clean energy and energy conservation measures at public facilities. The Budget includes \$154.9 million (\$89.8 million General Fund) and 326.5 positions for the Corps.

Since 2011, the Corps has expanded by 15 percent to 1,591 corpsmembers today; when four future residential centers are completed, there will be capacity for a total of nearly 2,000 corpsmembers.

The Budget provides funding to enhance services and training opportunities for current corpsmembers.

Significant Adjustments:

- Expansion of Residential Facilities—\$13 million General Fund to initiate four new residential facilities in Auberry, Los Pinos, Greenwood and Yountville and to rehabilitate two existing facilities in Ukiah and Fortuna. These projects are expected to add capacity for approximately 350 additional corpsmembers. Residential centers have higher rates of attendance and academic achievement, which are critical to corpsmember completion of the programs and improved outcomes.
- Fire Training Center—\$3.5 million General Fund to facilitate corpsmember participation in the Firefighter Training and Certification Program for ex-offenders. For additional information on this proposal, see the Public Safety Chapter.
- CAL FIRE/Corps Fire Crews—\$2.3 million General Fund to support five CAL FIRE/Corps fire crews for wildland fire suppression, emergency incident mitigation, and fire prevention and resource management work.
- Corpsmember Counseling, Case Management and Transition to College, Career, or Training—\$1.1 million (\$600,000 General Fund) to strengthen the career pathway of corpsmembers to college, career or advanced training by providing case management services.